



College of Engineering, Construction and Living Sciences
Bachelor of Information Technology
ID721001: Mobile Application Development
Level 7, Credits 15
Presentation: Advanced Android Topic

Assessment Overview

In this **individual** assessment, you will research, prepare & present a mobile-related topic. The information presented must be in a **README.md** file. Also, you need to provide a code example to accompany the **README.md** file. The main purpose of this assessment is to demonstrate your ability to identify and effectively articulate an intermediate/advanced topic in **Android**.

Learning Outcomes

At the successful completion of this course, learners will be able to:

1. Implement & publish complete, non-trivial, industry-standard mobile applications following sound architectural & code-quality standards.
2. Identify relevant use cases for a mobile computing scenario & incorporate them into an effective user experience design.
3. Follow industry standard software engineering practice in the design of mobile applications.

Assessments

| Assessment | Weight | Due Date | Learning Outcomes |
|--------------------------------------|--------|-----------------------------------|-------------------|
| Project: Travelling Application | 60% | 28-10-2022 (Friday at 4.59 PM) | 1, 2, 3 |
| Practical: Problem-Solving | 20% | 26-08-2022 (Friday at 4.59 PM) | 1, 2, 3 |
| Presentation: Advanced Android Topic | 20% | 16-11-2022 (Wednesday at 4.59 PM) | 2, 3 |

Conditions of Assessment

You will complete this assessment during your learner-managed time. However, there will be time during class to discuss the requirements & your progress on this assessment. This assessment will need to be completed by **Wednesday, 16 November 2022 at 4.59 PM**.

Pass Criteria

This assessment is criterion-referenced (CRA) with a cumulative pass mark of **50%** over all assessments in **ID721001: Mobile Application Development**.

Authenticity

All parts of your submitted assessment **must** be completely your work. If you use code snippets from **GitHub**, **StackOverflow** or other online resources, you **must** reference it appropriately using **APA 7th edition**. Provide your references in the **README.md** file in your repository. Failure to do this will result in a mark of **zero** for this assessment.

Policy on Submissions, Extensions, Resubmissions & Resits

The school's process concerning submissions, extensions, resubmissions & resits complies with **Otago Polytechnic** policies. Learners can view policies on the **Otago Polytechnic** website located at <https://www.op.ac.nz/about-us/governance-and-management/policies>.

Submission

You **must** submit all presentation files via **GitHub Classroom**. Here is the URL to the repository you will use for your submission - <https://classroom.github.com/a/Pfexjhjb>. The latest presentation files in the **master** or **main** branch will be used to mark against the **Documentation** criterion. Late submissions will incur a **10% penalty per day**, rolling over at **5:00 PM**.

Extensions

Familiarise yourself with the assessment due date. If you need an extension, contact the course lecturer before the due date. If you require more than a week's extension, a medical certificate or support letter from your manager may be needed.

Resubmissions

Learners may be requested to resubmit an assessment following a rework of part/s of the original assessment. Resubmissions are to be completed within a negotiable short time frame & usually **must** be completed within the timing of the course to which the assessment relates. Resubmissions will be available to learners who have made a genuine attempt at the first assessment opportunity & achieved a **D grade (40-49%)**. The maximum grade awarded for resubmission will be **C-**.

Resits

Resits & reassessments **are not** applicable in **ID721001: Mobile Application Development**.

Instructions

List of topics:

- Animations
- Biometric authentication
- CameraX
- Compose
- Dagger
- Environment sensors
- Hilt
- Location
- Media player
- Motion sensors
- Notifications
- Position sensors
- View binding
- View pager
- Work manager

Documentation - Learning Outcomes 2, 3 (50%)

- Documentation must contain the following sections:
 - Overview - a brief description of what the topic is.
 - Dependencies - it may include the name, version number, etc. If it is not required, please indicate it appropriately.
 - Code example - a description of each code snippet in relation to the topic. It means you **only** have to describe the essential files.
 - References - the information in your documentation is referenced using **APA 7th edition**.
 - * **Resource:** <https://studentservices.op.ac.nz/learning-support/citingandreferencing>
- Use of **Markdown**, i.e., bold text, code blocks, etc.
- Correct spelling & grammar.

Presentation 2, 3 (50%)

- Present your documentation, i.e., **README.md** via a video recording. In addition, you **must**:
 - Upload your presentation to your **OP student OneDrive**.
 - Provide a link to your presentation in your documentation.
- Answer the following:
 - Describe how would you implement it into your travelling **Project**.

Additional Information

- Your presentation must not exceed **15 minutes** in length.